



Colorado Department of Human Services Technology Requests

FY 2015-16

January 30, 2015

Presented to Joint Technology Committee



MISSION:

Collaborating with our partners, our mission is to design and deliver high quality human and health services that improve the safety, independence, and well-being of the people of Colorado.

VISION:

The people of Colorado are safe, healthy, and prepared to achieve their greatest aspirations.

VALUES:

The Colorado Department of Human Services will:

- Make decisions with, and act in the best interests of, the people we serve because Colorado's success depends on their well-being.
- Share information, seek input, and explain our actions because we value accountability and transparency.
- Manage our resources efficiently because we value responsible stewardship.
- Promote a positive work environment to support and develop employees, because their performance is essential to Colorado's success.
- Meaningfully engage our partners and the people we serve because we must work together to achieve the best outcomes.
- Commit to continuous learning because Coloradans deserve effective solutions today and forward-looking innovation for tomorrow.



CDHS Snapshot

Direct Services

- ✓ 3 Regional Centers
- ✓ 2 Mental Health Institutes
- ✓ 10 Youth Correctional Facilities
- ✓ 5 Veterans Community Living Centers
- ✓ Vocational Rehabilitation
- ✓ Disability Determination
- ✓ Veterans Cemetery
- ✓ Regulatory Oversight

Community Programs

- ✓ County Programs
- ✓ Community Mental Health Centers
- ✓ Community Centered Boards
- ✓ Independent Living Centers
- ✓ Refugee Services
- ✓ Domestic Violence Programs
- ✓ Early Childhood Councils
- ✓ Area Agencies on Aging
- ✓ Tony Grampsas Youth Services
- ✓ Ombudsman Programs
- ✓ 34 Boards and Commissions

CDHS Technology Snapshot

- Over 20 IT systems delivering critical services for 80 lines of business.
- Providing case management, financial management, healthcare management.
- More than 13,000 users access the Department's IT systems.
 - 4,906 CDHS employees
 - 7,100 county users
 - 1,446 community providers (e.g. substance use treatment, child care, case managers, etc.)
- The Governor's Office of Information Technology (OIT) and multiple vendors partners maintain the infrastructure and systems on behalf of the Department.

CDHS 2014-15 Goals

At Colorado Department of Human Services,
we are **People Who Help People:**

To thrive in their communities

To achieve meaningful employment

To prepare for educational success
throughout their life



5

FY 2015-16 CDHS General Fund Requests:

- Electronic Health Record and Pharmacy System Replacement- Phase 2, \$4,863,145
- Child Welfare Case Management System Replacement- Trails, \$4,648,707
- Data Integration and Analysis System, \$1,200,949
- Enterprise Content Management, \$500,400
- IT Systems Interoperability, \$1,413,930
- Child Care Automated Tracking System Enhancement- CHATS (\$1,533,125 Spending authority for Federal funds)

* In many cases other funds may be leveraged



6

FY 2015-16 CDHS Requests:

Project	Request Type	FY 2015-16 Request		
		Total	General Fund	Federal Funds
Electronic Health Record and Pharmacy System Replacement	Capital Construction IT Request	\$ 4,863,145	\$ 4,863,145	\$ -
	Operating Request *	\$ 584,028	\$ 584,028	\$ -
	Total	\$ 5,447,173	\$ 5,447,173	\$ -
Child Welfare Case Management System Replacement	Capital Construction IT Request	\$ 6,824,567	\$ 4,648,707	\$ 2,175,860
	Operating Request *	\$ 191,758	\$ 159,159	\$ 32,599
	Total	\$ 7,016,325	\$ 4,807,866	\$ 2,208,459
Data Integration and Analysis Systems, Division of Community and Family Support	Capital Construction IT Request	\$ 1,636,949	\$ 1,200,949	\$ 436,000
	Operating Costs	\$ -	\$ -	\$ -
	Total	\$ 1,636,949	\$ 1,200,949	\$ 436,000
Content Management	Capital Construction IT Request	\$ 269,400	\$ 269,400	\$ -
	Operating Request	\$ 231,000	\$ 231,000	\$ -
	Total	\$ 500,400	\$ 500,400	\$ -
IT Systems Interoperability	Capital Construction IT Request	\$ 12,815,940	\$ 1,281,594	\$ 11,534,346
	Operating Request	\$ 1,323,360	\$ 132,336	\$ 1,191,024
	Total	\$ 14,139,300	\$ 1,413,930	\$ 12,725,370
Child Care Automated Tracking System Enhancement	Capital Construction IT Request	\$ 1,533,125	\$ -	\$ 1,533,125
	Operating Request *	\$ 900,000	\$ -	\$ 900,000
	Total	\$ 2,433,125	\$ -	\$ 2,433,125

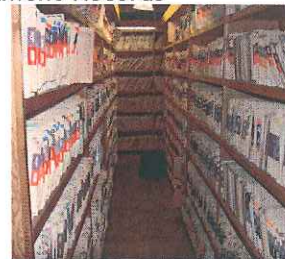
* FY 2015-16 Budget Requests before the Joint Budget Committee

Electronic Health Record and Pharmacy System Replacement- Phase 2

Electronic Health Record and Pharmacy System Replacement- Phase 2 (\$4,863,145)

What is the problem?

- INEFFICIENCY AND RISK TO PATIENTS
- Separate, loosely integrated systems (Health, Dietary, Pharmacy)
- Used by approximately 450 clinical staff daily for \$8,000+ number of patients per year:
 - Admission/Discharge/Diagnostics/Legal Commitment Records
 - Patient Safety Roster
 - Patient Specific Orders/Alerts/Notifications
 - Clinic and Medical Orders and Outcomes
 - Laboratory System Lawsuit Compliance
- Audit findings



Electronic Health Record and Pharmacy System Replacement- Phase 2 (\$4,863,145)

What is the solution?

The EHR will-

- Improve clinical decision making:
 - automatic alerts to patients that are aggressive, suicidal, have fallen, had a medical emergency, were placed on high-alert medications, etc.
 - Connecting patient acuity to patient treatments and outcomes.
- Reduce medication errors.
 - Automating physician orders; bar-code-reader verification; electronic medication administration record (eMAR);
- Improve efficiency
 - Fully integrated clinical, operations, and financial functions for staff efficiency.
 - Compliant with meaningful-use requirements and capable of connecting with other EHRs.
 - Address audit findings.

Electronic Health Record and Pharmacy System Replacement- Phase 2 (\$4,863,145)

Timeline Overview

Phase I Activities / Deliverables - FY 2014 -15	Phase II Activities / Deliverables - FY 2015-16
Vendor Selection (Completed) Contract & Vendor Engagement (In Progress)	Continue System Build Activities
Refine Project Plans / Timelines (In Progress)	Procure User Hardware (Tablets, Bar Code Scanners, etc.)
Review and Guide Provider Proposed Work Flows and Organizational Effort (In Progress)	Complete Infrastructure Projects
Detailed System Customization Planning (In Progress)	System Testing
Project Design Development(In Progress)	Staff System Training
Commence System Build (Upon signing contract)	System Implementation
Infrastructure Projects - Improve network capacity and implement wireless (In Progress)	

Child Welfare Case Management System Replacement- Trails

Child Welfare Case Management System Replacement-TRAILS (\$4,648,707)

Case management system for Child Welfare, Youth Corrections, Early Childhood, Administrative Review, Office of Child Protection Ombudsman, 64 counties.

Used for:

- Case management
- Financial transactions for the 64 counties
- Benefits and payments
 - Foster parents and provider payments
- Federal, state, and county reports
- Official system of record for Child Welfare

Child Welfare Case Management System Replacement-TRAILS (\$4,648,707)

What is the problem?

Trails modernization to address deficiencies:

- 30% of county caseworker time is documentation according to Office of State Auditor work load assessment.
- Difficult navigation and time consuming data entry.
- Case workflow that does not match practice.
- Inadequate tools for counties to manage caseload.
- Older software components not supported by vendor resulting in HIPAA non-compliance (mitigated by other controls).
- Audit findings related to medication errors, psychotropic medications, and integrating with an EHR.

Child Welfare Case Management System Replacement-TRAILS (\$4,648,707)

What is the solution?

DHS engaged Istonish in FY 2013-14 for an analysis of Trails. Recommends modernizing Trails to:

- Ease use by caseworkers.
- Improve reporting.
- Improve county case management.
- Integrate data to improve overall case management.
- Align with the Colorado Performance Center for public accountability.

Data Integration and Analysis System

Data Integration and Analysis System

(\$1,200,949)

- The Office of Early Childhood, created in 2012, coordinates and oversees
 - Early learning, child mental health, and child abuse prevention and parent education to help parents help their children thrive and be ready for kindergarten

Division of Community and Family Supports

- EI - Early Intervention
- MIECHV - Maternal Infant Early Childhood Home Visitation
- ECMHS - Early Childhood Mental Health Services
- PSSF - Promoting Safe and Stable Families
- CBCAP - Community-Based Child Abuse Prevention
- CCR - Colorado Community Response Program
- Trust Fund - Colorado Children's Trust Fund
- other State Departments to improve the integration and delivery of early childhood services.



17

Data Integration and Analysis System

(\$1,200,949)

What is the problem?

- The 7 programs within DCFS currently have 7 different ways of capturing, storing, analyzing and reporting data.
 - Access databases
 - Excel spreadsheets
- Limited ability to measure service delivery, inputs, outputs, and outcomes.



18

Data Integration and Analysis Systems **(\$1,200,949)**

What is the solution?

- Leverage existing technology by building upon the Early Intervention database, currently under construction.
- Integrated system to effectively manage outcomes in individual programs; analyze and identify opportunities for service enhancements.
- Case workers will be able to seamlessly capture data, allowing more time and resources for client interaction.
- The project will interface with existing data and analysis systems including the Race to the Top Quality Rating Improvement System (QRIS).

Enterprise Content Management

Enterprise Content Management (\$500,400)

What is the problem?

- INEFFICIENCY & WASTE
 - Estimated 8,300 hours annually manually routing and tracking paper documents.
 - Creation, routing, approving, and archiving files cumbersome without a central repository.
 - Version control.
 - Documents easily misrouted.
 - Transportation delays.
 - Poor tracking and accountability.
- LEAN analyses identified need for content management solution

Enterprise Content Management (\$500,400)

What is the solution?

- Agency-wide document and content management system.
 - Create a library for electronic files
 - Standardize and automate workflow
 - Relegate processes to the background
 - Automate document retention
 - Increase security, backup and recovery
- Aligned with the State and OIT's strategic direction.
- Dramatic improvement in efficiency and accountability.

IT Systems Interoperability

IT Systems Interoperability (\$1,413,930)

What is the problem?

- People supported by DHS have disconnected experiences across services.
- Families burdened with coordinating their services.
- Workers don't have timely access to information in other systems.
- Counties struggle to manage case work crossing systems.
- Department cannot easily aggregate information to align services.

IT Systems Interoperability (\$1,413,930)

- Awarded Planning Grant from Administration for Children and Families (ACF) in 2012-
 - \$1,125,000 grant to design system of Interoperability.
 - Completed “*Interoperability Roadmap*” January 2014.
- To explore and plan improved interoperability and integration for-
 - Eligibility
 - Enrollment
 - Case management
 - Streamline administration
 - Strengthen program integrity

IT Systems Interoperability (\$1,413,930)

Interoperability will be six integrated components:

- **Data:** Define the data & data structures in our IT systems.
- **Privacy:** Data governance to ensure data is used appropriately to protect privacy.
- **Security:** Guarantee data integrity and protection.
- **Identity Management:** Ensure correct people have correct access
- **Identity Resolution:** Identify individuals across multiple data sets.
- **De-identify & Analysis:** Create a platform for reporting, dash boarding, and predictive analytics.

IT Systems Interoperability (\$1,413,930)

What is the solution?

Connection with a purpose

- Utilizes Federal 90/10 funding match.
- 5-year plan to interoperable environment-
 - Year 1: Continue work, establish governance, engage vendors
 - Year 2: Implement with 2 to 3 systems
 - Years 3 to 5: Implement across Department systems
- Designed in cooperation with OIT.
- Utilizes State IT strategies.
- Scalable to other agencies.
- Implements national standards.

Child Care Automated Tracking System Enhancement- CHATS

Child Care Automated Tracking System Enhancement **CHATS (\$1,533,125)**

CHATS is the Child Care Assistance Program (CCCAP) subsidy payment system.

- **Counties** use to determine eligibility for Child Care Assistance Program.
- **Child care providers** reimbursed by counties.
- **Families** participating in CCCAP use CHATS to record attendance.
 - Average daily utilization is 10,000+ children



29

Child Care Automated Tracking System Enhancement **CHATS (\$1,533,125)**

- CHATS fully implemented in 2010.
- Completed within specifications, some functionality not meeting expectations, and additional functional needs identified.
- Lack of resources lead to-
 - Not addressing all needs
 - Slow response to provider and county requests
 - Increasing system instability
- 2014 engagement with BerryDunn for assessment of CHATS and new Office of Early Childhood initiatives.
 - Recommendation for hybrid modernization



30

Child Care Automated Tracking System Enhancement **CHATS (\$1,533,125)**

What is the problem?

- **Providers (small businesses)** – Point of Service (POS) attendance system is difficult to use and manage.
- **Counties**– Lack of information to effectively manage the allocation, resulting in too few families served.
- **State**– Difficult to adapt system to meet family, provider and county needs.
- **Families**– Child care assistance is stigmatized.



31

Child Care Automated Tracking System Enhancement **CHATS (\$0- 100% Fed Funds)**

What is the solution?

- \$1,533,125 Federal funds in FY 2015-16
 - Modernize CHATS infrastructure
 - Stabilize system
 - Incrementally enhance and replace CHATS modules
 - Replace Point of Service (POS) attendance tracking system
 - Improve the family experience
 - Simplify management for providers
 - Enhance county management functionality
 - Simplify and expand reporting capabilities



32



Joint Technology Committee Hearing

Questions?